Revised Scope of Work Deliverable
Organix LLC (Former John J. Riley Site)
240 Salem Street
Woburn, Massachusetts

Submitted to: United States Environmental Protection Agency

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June 12, 2006

Mr. Frank Gardner
United States Environmental Protection Agency
Emergency Response and Removal Section II
1 Congress Street, Suite 1100, Mail Code HBR

Re: Revised Scope of Work Deliverable
Organix LLC (Former John J. Riley Site)
240 Salem Street
Woburn, Massachusetts

Dear Mr. Gardner:

The attached Revised Scope of Work Deliverable (Deliverable) presents the components of the generic scope of work presented in EPA's letter to Organix dated March 29, 2006. This Revised Deliverable addresses comments that were received by email on June 9, 2006 following EPA's review of the original Deliverable dated April 25, 2006 (Appendix B). This Deliverable presents the following components of the Scope of Work: Site Security, Notification of Contractor Selection, Site Specific Health and Safety Plan (HASP), Quality Assurance Plan (QAP), Site Assessment Plan (SAP), and Site Assessment Report and Cleanup Plan (SAR/CR). This Deliverable specifically addresses an area of exposed impacted soil/contaminated media located along the bank of a stormwater drainage swale on the Organix property and has been presented with a level of detail commensurate with the complexity of the Site and proposed removal action.

Senior Project Manager

Please contact us if you have any question or comments regarding this Deliverable.

Very truly yours,

Konald E. Myrick, Jr., P.E, L.S.P.

Project Manager

CC: Mr. John Doherty, Organix, Inc.

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Table of Contents

1.0	Back	ground		1				
2.0	Site S	Site Security						
3.0			f Contractor Selection					
4.0			Health and Safety Plan					
5.0	Quality Assurance Plan (QAP)							
6.0			ment Plan (SAP) and Site Assessment					
7.0		Site Assessment Report and Cleanup Plan (SAR/CP)						
	7.1		ssessment Summary					
	7.2		sed Cleanup Plan					
		7.2.1	Preliminary Soil Sampling					
		7.2.2	Site Preparation and Clearing	4				
		7.2.3	Excavation of Impacted Soil/Contaminated Media					
		7.2.4	Bank Stabilization	5				
		7.2.5	Additional Assessment Activities					
		7.2.6	Option for Complete Removal of Impacted Soil/Contaminated Media	5				
		7.2.7	Approval and Implementation Schedule					
8.0	Comp	letion of	Work Report	6				

Table of Contents

1.0	Backg	ground		1	
2.0	Site S	ecurity .		1	
3.0			f Contractor Selection		
4.0	Site-S	pecific I	Health and Safety Plan	2	
5.0	Qualit	y Assura	ance Plan (QAP)	2	
6.0			ent Plan (SAP) and Site Assessment		
7.0	Site A	ssessme	nt Report and Cleanup Plan (SAR/CP)	3	
	7.1	Site A	ssessment Summary		
	7.2		sed Cleanup Plan		
		7.2.1	Preliminary Soil Sampling	4	
		7.2.2	Site Preparation and Clearing	4	
		7.2.3	Excavation of Impacted Soil/Contaminated Media	4	
		7.2.4	Bank Stabilization	5	
		7.2.5	Additional Assessment Activities	5	
		7.2.6	Option for Complete Removal of Impacted Soil/Contaminated Media	5	
		7.2.7	Approval and Implementation Schedule	6	
8.0	Compl	letion of	Work Report	6	

1.0 Background

The property identified as Organix LLC (Organix) at 240 Salem Street in Woburn, Massachusetts is located on a portion of the former Riley Company tannery property that was subdivided, purchased, and developed on or about 1998 and is identified as Lot 7. According to the United States Environmental Protection Agencies' (EPA) Removal Program Preliminary Assessment/Site Investigation Report for the John J Riley Site dated August 11, 2005, "possible tannery-related waste and high levels of chromium in surface soils have been identified in this particular area." The referred to "particular area" (the Site) is an eroded section of a drainage swale bank with exposed impacted soil/contaminated media. The EPA report states that "chromium was detected at concentrations up to 86,000 mg/kg in the drainage swale bank." A subsequent EPA Site Investigation Closure Memorandum dated March 15, 2006 also states that "a Removal Action is appropriate at this time" and the "removal action will be limited in scope to addressing the direct contact threat and threat of migration posed by this area of exposed waste material." Copies of EPA reports and letters are in Appendix B.

On March 28, 2006, Ronald Myrick and Robert Ankstitus of Rizzo Associates conducted a preliminary site inspection and observed the exposed impacted soil/contaminated media along an eroded portion of the drainage swale that transects the Organix property. The exposed impacted soil/contaminated media along the eroded portion of the drainage swale appeared to be a 2 to 3 foot thick veneer along approximately 35 feet of drainage swale bank. The thickness of the impacted soils upon the adjacent hillside was not determined.

As discussed above, the EPA-required removal action includes addressing direct contact and threat of migration issues posed by the area of exposed waste material. The EPA Scope of Work (SOW) will be implemented in conjunction with a Release Abatement Measure (RAM) under the Massachusetts Contingency Plan (MCP). The proposed removal action associated with the EPA SOW will generally consist of a limited removal of accessible/exposed contaminated soils and stabilization of the adjacent hillside slope along the drainage swale bank that is susceptible to possible further erosion and migration of contaminants in the event of a large rainfall event. Upon completion of the EPA SOW and approval of the Completion of Work Report (CWR), additional response actions and/or requirements will likely be implemented under the MCP.

2.0 Site Security

Access to the Site is generally restricted by a chain-link fence with posted "No Trespassing" signs, which limits transient movement (short cutting, etc.) through the Site area. Currently, the Site area is only accessible by foot from the southern side which requires passing adjacent to the Organix building.

Temporary fencing (4 foot hazard fencing or equivalent) will be installed around the identified impacted soil/contaminated media area following limited excavation, stabilization of exposed impacted soil/contaminated media, and additional assessment activities.

3.0 Notification of Contractor Selection

The SOW will be implemented by Rizzo Associates of Framingham, Massachusetts. Subcontractor selection has not been finalized.

4.0 Site-Specific Health and Safety Plan

A Site-specific Health and Safety Plan is in Appendix C.

5.0 Quality Assurance Plan (QAP)

The Quality Assurance Plan (QAP) presents proposed methods for sampling and laboratory analysis to provide analytical results of known quality. Based on available subsurface investigation data collected to date, the primary contaminant of concern (COC) is chromium in soil. Lead and arsenic have also been considered possible COCs since they have historically been detected at elevated concentrations in the Site area. Following impacted soil/contaminated media removal and slope stabilization activities (per Section 7.0), soil sampling will be conducted to assist in evaluating the likely extent of impacted soil/contaminated media and to evaluate Site conditions to support preparation of a risk characterization and/or evaluation of feasible response actions at the Site.

The quality assurance objectives of the QAP include considerations for precision, accuracy, completeness, and comparability. To assess precision and accuracy, field duplicate soil samples will be submitted for laboratory analysis, and, to assess completeness and comparability, Rizzo Associates' Standard Operating Protocols will be used (Appendix D).

Field duplicates will be submitted at frequency of approximately one sample for every ten field samples, per matrix. For soil sampling, field duplicates will be collected by homogenously mixing the soil and collecting two representative and equal aliquots of soil for placement into two clean laboratory-supplied jars. Field duplicates will provide precision data relative to homogeneity and distribution of the contaminants.

All collected soil samples will be placed in appropriate laboratory-supplied sampling jars; stored within a cooler containing ice; and transferred using chain-of custody procedures to a Massachusetts-certified laboratory for applicable analysis within permissible holding times.

6.0 Site Assessment Plan (SAP) and Site Assessment

Results of site assessment activities conducted to date are presented in EPA's Expanded Trip Report for John J Riley, Woburn, Massachusetts dated September 21, 2004 and EPA's Removal Program Preliminary Assessment/Site Investigation Report for the John J Riley Site, Woburn, Massachusetts dated August 11, 2005 (Appendix B). A Site reconnaissance was conducted by Rizzo Associates personnel on March 28, 2006 and April 10, 2006. No additional site assessment activities are planned prior to conducting the required removal action. Additional assessment activities will be conducted coincident or following the removal action to assist in evaluating the likely extent of impacted soil/contaminated media and the approximate volume of remaining

impacted soil/contaminated media. Data collected during site assessment activities may also be used to support preparation of a risk evaluation and/or to evaluate additional remedial alternatives. A description of proposed additional assessment activities to be conducted during the removal action is presented in the Site Assessment Report and Cleanup Plan (Section 7.0). A summary of the results of additional assessment activities will be presented in the Completion of Work Report.

7.0 Site Assessment Report and Cleanup Plan (SAR/CP)

As discussed above, the Site Assessment Summary is based upon site assessment activities conducted under the direction of EPA in 2004 and 2005 and documented in reports contained within Appendix B. The Proposed Cleanup Plan is based on the requirements outlined in EPA's March 29, 2006 letter to Organix. In addition, we propose to conduct additional assessment activities to evaluate the overall extent of the impacted soil/contaminated media in the Site area.

7.1 Site Assessment Summary

In general, EPA assessment activities identified elevated concentrations of chromium is soil and waste material along an eroded drainage swale and adjacent hillside. Table 1 presents available detected concentrations of target contaminants (chromium, arsenic, lead) in soil samples collected from the immediate Site area (swale and adjacent hillside) during EPA investigations. The approximate sample locations are presented on Figure 2. The existing available data and Site reconnaissance by Rizzo Associates personnel were sufficient for preparing the proposed Cleanup Plan for the required removal action. Additional proposed assessment activities to be conducted following the removal action are presented in Section 7.2.5.

7.2 Proposed Cleanup Plan

The required removal action was presented in EPA's letter *Notice of Potential Liability and Invitation to Perform or Finance Proposed Cleanup Activities* dated March 29, 2006 as follows:

- Eliminating the potential for direct contact with the contaminated soils/waste material and eliminating the threat of downstream migration through a combination of excavation and/or covering and securing the material in place;
- Sampling and monitoring as needed to conduct the above activities;
- Off-site disposal of cleanup-generated wastes at EPA-approved disposal facilities; and,
- Repairing response-related damage to affected areas of the Site.

The required time-table for completing the removal action was six to eight months.

Below is our proposed approach for achieving the required removal action:

7.2.1 Preliminary Soil Sampling

Prior to excavation activities, a composite soil sample consisting of approximately 10 grab soil samples from random locations and depths (up to 3 feet below the ground surface) within the Site area will be collected. The composite soil sample will be uniformly mixed and submitted for analysis of hexavalent chromium and total chromium (historical sampling has reportedly detected only trivalent chromium) as well as for typical soil disposal parameters including RCRA8 metals, TCLP RCRA8 metals, volatile organic compounds, semi-volatile organic compounds, polychlorinated biphenyls, ignitability, reactivity (sulfide/cyanide), pH, and total petroleum hydrocarbons. If applicable, the Health and Safety Plan will be revised to reflect the composite sample data.

7.2.2 Site Preparation and Clearing

Trees and vegetation within the Site area will be cut at the ground level and cleared. Cleared trees/vegetation will be placed upon the adjacent hillside and on the old paved driveway that extends down the hill past the Site area. The trees/vegetation will likely be chipped and spread upon the hillside or otherwise properly disposed at a later date.

7.2.3 Excavation of Impacted Soil/Contaminated Media

Proposed excavation will include approximately 20 to 30 cubic yards of impacted soils/ contaminated media that have been exposed as a result of erosion along approximately 35 feet of the bank of a stormwater drainage swale that transects the Organix property. The drainage swale bank is currently approximately vertical, and impacted soil/contaminated media are susceptible to erosion and migration resulting from a large precipitation event. The purpose of excavation activities is remove and dispose of exposed impacted soil/contaminated media along the eroded drainage swale bank and provide a suitable slope, relative to the adjacent hillside, that may be temporarily stabilized.

Impacted soil/contaminated media along approximately 35 feet of stormwater drainage swale bank will be excavated/scraped to reduce the slope and toe angle, as generally depicted on Figure 3. It is anticipated that a thickness of up to 3 feet will be excavated/scraped from the drainage swale bank. Excavated impacted soil/contaminated medial will be either directly loaded into a lined roll-off container or temporary stockpiled on polyethylene sheeting on the paved surface located adjacent to the Site area and then transferred to a lined roll-off container. Upon completion of excavation/scraping of the drainage swale bank and adjacent hillside, the bottom of the drainage swale will be excavated to remove any impacted soil/contaminated media that may have fallen into the drainage swale during excavation/scraping. Excavation of the drainage swale will include approximately 6-inches of existing rock and sediment material along the approximately 35 foot section of drainage swale. Confirmatory samples from the drainage swale bottom, drainage swale banks, and adjacent hillside in the Site area will be collected for laboratory analysis as part of the additional assessment activities described in Section 7.2.5.

Following final characterization and receiving facility approval, the excavated soils will be transported under a Hazardous Waste Manifest or MCP Bill of Lading to the proper licensed facility.

7.2.4 Bank Stabilization

Temporary stabilization of the exposed bank will be conducted by installing geotextile fabric over and staked hay bales around the top and sides of exposed area footprint. Haybales will be placed and staked upon a benched surface of the hillside on the upper side of the excavation. To limit erosion of the drainage swale bank, 3-6 inch stone rip-rap will be placed from the toe to approximately 5 feet up of the stabilized slope along the excavated area. Temporary fence (hazard fence or equivalent) will be installed around the stabilized slope to limit access. Figure 3 depicts the proposed bank stabilization approach.

7.2.5 Additional Assessment Activities

It is anticipated that up to 30 soil samples will be collected following the required impacted soil/contaminated media removal and slope stabilization. Soil borings and test pits will be advanced within the Site area to assess the horizontal and vertical extent of contamination within the drainage swale, adjacent bank and adjacent hillside following excavation of impacted soil/contaminated media. Soil samples will be collected from the surface (top 6 inches) to a maximum 5 feet below the ground surface, or encountered refusal, at locations represented by a general horizontal grid pattern using 10 foot grid spacing (grid spacing may be adjusted based on field observations). Soil samples will be collected using a hand auger, manual GeoProbe, and/or from excavator test pits, and soil sampling intervals will be determined in the field based on encountered soil conditions.

Based on previous site investigations and inspections, the impacted soil/contaminated media appears to be visually distinguishable from the non-impacted native soils in the Site area. In general, it is anticipated that two soil samples will be collected, prepared, and submitted for each sample location. The first soil sample will represent the impacted soil/contaminated media and will be a composite soil sample for the interval located above the assumed non-impacted native deposits. The second soil sample will be a grab sample from an approximately 6-inch interval of underlying assumed non-impacted native soils beneath the impacted soils. The sample locations and collection methods may be adjusted in the field based on access considerations, utility locations, and field observations. Each of the soil samples will be analyzed for total chromium, total arsenic and total lead. Additional analysis of the collected soil samples may be conducted pending the results of the disposal characterization sample (collected from the roll-off container) associated with the removal action.

7.2.6 Option for Complete Removal of Impacted Soil/Contaminated Media

Based on the results of the additional assessment activities in the Site area, it may be determined that the extent of contamination is limited such that it would be appropriate to excavate the remaining identified impacted soil/contaminated media for off-site disposal under this SOW. The decision to proceed with complete removal of impacted soil/contaminated medial at the Site will be made following the additional assessment activities, and EPA will be contacted for approval to proceed if such conditions are encountered.

7.2.7 Approval and Implementation Schedule

Upon approval of this Cleanup Plan, we will prepare and submit a Release Abatement Measure (RAM) Plan to the Massachusetts Department of Environmental Protection (DEP) for implementing the described removal action under the MCP. It is anticipated that implementation will commence within one month following EPA approval, pending subcontractor scheduling. Below is a summary of the proposed implementation schedule:

- EPA approval of Deliverable
- Week 1 Preliminary soi! sampling (Section 7.2.1)
- Week 2 Complete and submit MCP RAM Plan to the Massachusetts DEP
- Week 2, 3, 4, and/or 5 Site preparation and clearing (Section 7.2.2); implementation of Removal Action (7.2.3 and 7.2.4); additional assessment activities (7.2.5)
- Week 3, 4, 5, or 6 Waste disposal
- By week 10 Completion of Work Report (Section 8.0) submitted to EPA

8.0 Completion of Work Report

Upon completion of the removal action and additional assessment activities, a Completion of Work Report will be prepared. The Completion of Work Report will summarize the removal action and include applicable disposal documentation (Hazardous Waste Manifest or MCP Bill of Lading). In addition, the Completion of Work Report will present the results of the additional assessment activities including the identified extent of impacted soil/contaminated media. The Completion of Work Report will also present feasible additional remedial actions within the Site area, if applicable, which will likely include an evaluation of the following approaches:

- Extension or modification of existing stormwater conveyance structures to reduce the likelihood of erosion in the Site area;
- Containment of residual impacted soil/contaminated media upon the hillside using an engineered barrier (cap or cover);
- Excavation and disposal of all identified impacted soil/contaminated media from the Site
 area.

It is anticipated that additional assessment and/or remedial response actions, including assessment of other areas of the Organix property and/or remedial actions within the Site area, will be conducted under the MCP. Copies of subsequent MCP submittals may be forwarded to EPA, if desired.

Location: Sample Name: Laboratory: Laboratory I.D.:	Organix-Woburn jjr-050811-01 US EPA NA	jjr-050811-03 US EPA NA	Organix-Woburn SO-01 Severn Trent NA	Organix-Woburn SO-02 Severn Trent NA	Organix-Woburn SO-03 Severn Trent NA	MCP RCS-2 Standard
Sample Date:	8/11/2005	8/11/2005	6/22/2004	6/22/2004	6/22/2004	mg/kg
Arsenic, Total	<420	<390	<1.8	<1.0	<1.4	20
Chromium (total) ¹	86,000	3,800	310	286	49,000	200
Chromium (III) ¹	na	na	na	na	na	3,000
Lead, Total	530	2,500	151	10.4	637	300

I - Available analytical is reported as "total chromium"; however only chromium (III) has reportedly been detected in the Site area



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2,000 Feet

Information obtained from USGS Map of Boston North & Lexinton Massachusetts Quadrangle dated 1985 USGS Map of Reading & Wilmington, Massachusetts
Quadrangle dated 1987

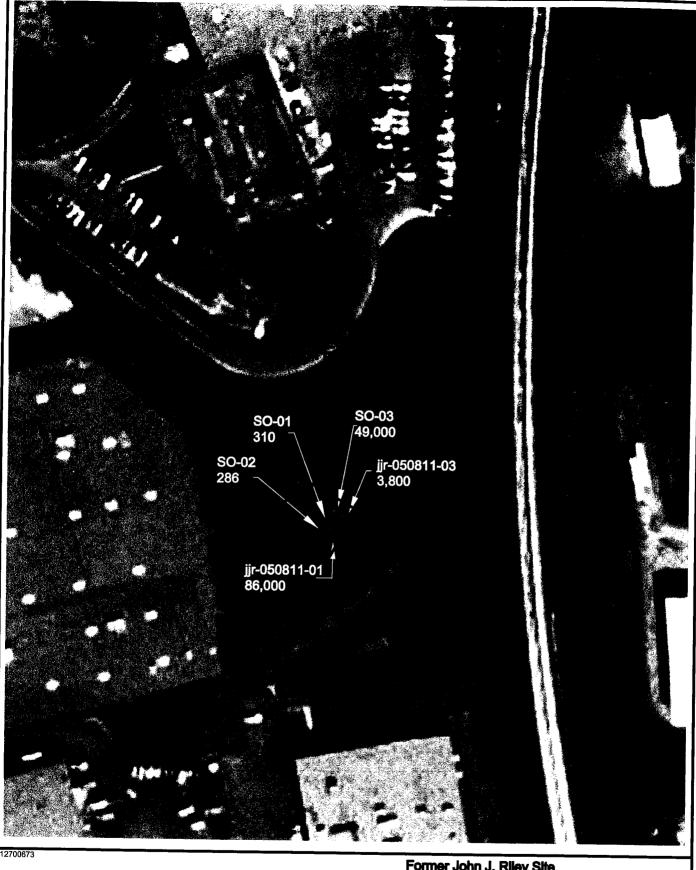
Former John J. Riley Site 240 Salem Street Woburn, MA

Site Locus Plan

Figure

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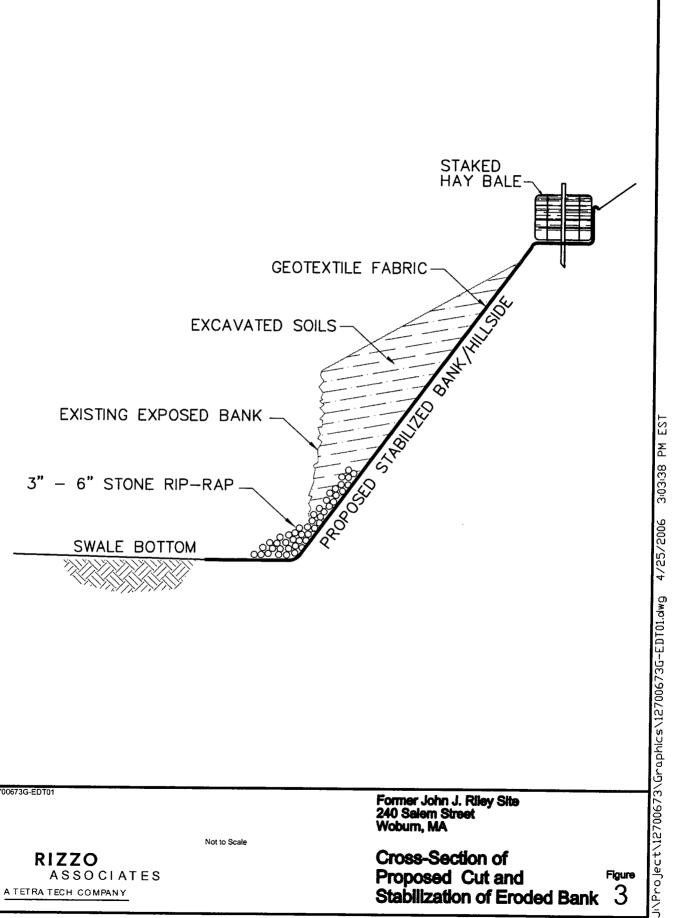


Former John J. Riley Site 240 Salem Street Woburn, MA

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Site Plan with Sediment/Soil **Sampling Locations**

Figure



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Former John J. Riley Site 240 Salem Street Woburn, MA

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Cross-Section of
Proposed Cut and
Stabilization of Eroded Bank 3

Figure

Not to Scale

Appendix A: Limitations

- 1. The observations described in this report were made under the conditions stated therein. The conclusions presented in the report were based solely upon the services described therein, and not on scientific tasks or procedures beyond the scope of described services or the time and budgetary constraints imposed by Client. The work described in this report was carried out in accordance with the Terms and Conditions in our contract.
- 2. In preparing this report, Rizzo Associates has relied on certain information provided by state and local officials and other parties referenced therein, and on information contained in the files of state and/or local agencies available to Rizzo Associates at the time of the site assessment. Although there may have been some degree of overlap in the information provided by these various sources, Rizzo Associates did not attempt to independently verify the accuracy or completeness of all information reviewed or received during the course of this site assessment.
- 3. Observations were made of the Site and of structures on the Site as indicated within the report. Where access to portions of the Site or to structures on the Site was unavailable or limited, Rizzo Associates renders no opinion as to the presence of hazardous materials or oil, or to the presence of indirect evidence relating to hazardous material or oil, in that portion of the Site or structure. In addition, Rizzo Associates renders no opinion as to the presence of hazardous material or oil, or the presence of indirect evidence relating to hazardous material or oil, where direct observation of the interior walls, floor, or ceiling of a structure on a Site was obstructed by objects or coverings on or over these surfaces.
- 4. Rizzo Associates did not perform testing or analyses to determine the presence or concentration of asbestos at the Site or in the environment at the Site.
- 5. It is ENGINEER's understanding that the purpose of this report is to assess the physical characteristics of the subject Site with respect to the presence on the Site of hazardous material or oil. This stated purpose has been a significant factor in determining the scope and level of services provided for in the Agreement. Should the purpose for which the Report is to be used or the proposed use of the site(s) change, this Report is no longer valid and use of this Report by CLIENT or others without ENGINEER's review and written authorization shall be at the user's sole risk. Should ENGINEER be required to review the Report after its date of submission, ENGINEER shall be entitled to additional compensation at then existing rates or such other terms as agreed between ENGINEER and the CLIENT.
- 6. The conclusions and recommendations contained in this report are based in part, where noted, upon the data obtained from a limited number of soil samples obtained from widely spaced subsurface explorations. The nature and extent of variations between these explorations may not become evident until further exploration. If variations or other latent conditions then appear evident, it will be necessary to reevaluate the conclusions and recommendations of this report.
- 7. Any water level readings made in test pits, borings, and/or observation wells were made at the times and under the conditions stated on the report. However, it must be noted that fluctuations in the level of groundwater may occur due to variations in rainfall and other factors different from those prevailing at the time measurements were made.

- 8. Except as noted within the text of the report, no quantitative laboratory testing was performed as part of the site assessment. Where such analyses have been conducted by an outside laboratory, Rizzo Associates has relied upon the data provided and has not conducted an independent evaluation of the reliability of these data.
- 9. The conclusions and recommendations contained in this report are based in part, where noted, upon various types of chemical data and are contingent upon their validity. These data have been reviewed and interpretations made in the report. As indicated within the report, some of these data may be preliminary screening level data and should be confirmed with quantitative analyses if more specific information is necessary. Moreover, it should be noted that variations in the types and concentrations of contaminants and variations in their flow paths may occur due to seasonal water table fluctuations, past disposal practices, the passage of time, and other factors. Should additional chemical data become available in the future, these data should be reviewed, and the conclusions and recommendations presented herein modified accordingly.
- 10. Chemical analyses have been performed for specific constituents during the course of this site assessment, as described in the text. However, it should be noted that additional chemical constituents not searched for during the current study may be present in soil and/or groundwater at the Site.
- 11. This Report was prepared for the exclusive use of the CLIENT. No other party is entitled to rely on the conclusions, observations, specifications, or data contained therein without the express written consent of ENGINEER.
- 12. The observations and conclusions described in this Report are based solely on the Scope of Services provided pursuant to the Agreement. ENGINEER has not performed any additional observations, investigations, studies, or testing not specifically stated therein. ENGINEER shall not be liable for the existence of any condition, the discovery of which required the performance of services not authorized under the Agreement.
- 13. The passage of time may result in significant changes in technology, economic conditions, or site variations that would render the Report inaccurate. Accordingly, neither the CLIENT, nor any other party, shall rely on the information or conclusions contained in this Report after six months from its date of submission without the express written consent of ENGINEER. Reliance on the Report after such period of time shall be at the user's sole risk. Should ENGINEER be required to review the Report after six months from its date of submission, ENGINEER shall be entitled to additional compensation at then existing rates or such other terms as may be agreed upon between ENGINEER and the CLIENT.
- 14. ENGINEER has endeavored to perform its services based upon engineering practices accepted at the time they were performed. ENGINEER makes no other representations, express or implied, regarding the information, data, analysis, calculations, and conclusions contained herein.
- 15. The services provided by ENGINEER do not include legal advice. Legal counsel should be consulted regarding interpretation of applicable and relevant federal, state, and local statutes and regulations and other legal matters.

Standard Operating Protocol for Soil Sampling with a Spade and Scoop

Discussion

The simplest, most direct method of collecting soil samples is with a spade and scoop. Remove the top cover of soil to the required depth with a lawn or garden spade and then use a smaller stainless steel scoop to collect the sample.

Uses

This method can be used in most soil types but is limited to sampling near the surface. Samples from depths greater than 50 cm are extremely labor intensive in most soil types. Very accurate, representative samples can be collected with this procedure. Use a flat, pointed mason trowel to cut a block of the desired soil when undisturbed profiles are required. A stainless steel scoop or lab spoon can be used in most other applications. Avoid the use of devices plated with chrome or other materials that may contaminate samples for laboratory analysis.

Procedures for Use

- 1. Prior to initiating any work, the Field Technician and the Project Manager will review the Health and Safety Plan developed for the specific site activities. The indicated measures of the Plan should be enacted prior to initiation of the sampling activities. Concerns not addressed in the Health and Safety Plan document are to be brought immediately to the attention of the Health and Safety Officer.
- 2. Carefully remove the top layer of soil to the desired sample depth with a shovel or spade.
- 3. Use a stainless steel scoop or trowel to remove and discard the layer of soil that was in contact with the shovel.
- 4. Collect the sample and transfer it to an appropriate sample bottle with a stainless steel spoon or equivalent.
- 5. Check that a teflon liner is present in the cap, if required. Secure the cap tightly.
- 6. Label the sample jar and document the sample location, depth and field conditions in the field log. Complete the chain-of-custody. Store samples for laboratory analysis in a cooler.
- 7. Decontaminate equipment after use and between sample locations according to the Standard Operating Protocol for Decontaminating Sampling Equipment.

Adapted from

Characterization of Hazardous Waste Sites — A Methods Manual: Volume II Available Sampling Methods, Second Edition, EPA-600/14-84-076, December 1984.

Standard Operating Protocol for Test Pit Excavation and Sampling

Purpose

Test pit and trenches are excavated with backhoe equipment to provide detailed visual examination of near surface soil, groundwater, and bedrock conditions. The advantages of test pits over soil borings are as follows:

- The near surface stratigraphy is exposed, making sample collection and recovery easier in addition to the logging of soils, water levels, and bedrock surface.
- Information is provided on the lateral and vertical extent of subsurface features.

Site-specific safety issues (i.e., test pit stability, contamination potential, and impacts to groundwater) should be considered when designing a test pit program.

- Installation of monitoring wells in test pits is not recommended.
- Samples for volatile organic compounds should not be collected from test pit excavations.

Procedures

- Contact DIG SAFE at (800) DIG-SAFE prior to any subsurface investigation. In addition, contact local utilities that may have underground services on or near the Site.
- Mark the location of potential test pits to the nearest foot.
- At the direction of the geologist on-site, the backhoe operator will excavate the test pit in increments.
- At each increment, the geologist will inspect the test pit and decide whether to collect samples.
- Test pit excavations will cease if any of the following occurs:
 - Distinct changes in stratigraphy or materials
 - Odors
 - Groundwater or fluid phase contaminants
 - Drums or other potential waste containers
 - Utilities not previously identified

Excavation will resume only at the direction of the geologist on Site.

Unless otherwise specified and the site-specific Health and Safety Plan discusses appropriate procedures, no personnel will enter the test pit. In addition, all test pits will be backfilled on the

day of excavation. In most cases, excavation materials will be used to fill the test pit. In the event that highly contaminated material is excavated and it is expected that it will be more cost-effective to remove the soil from the site rather than use it as backfill, excavated soils will be stockpiled on polypropylene and the excavation will be filled with clean soil.

Field Log Information

- At a minimum, field logs for test pit excavation will include the following documentation:
- Plan and profile sketches of the test pit showing materials encountered, the depth of materials, and sample locations
- Sketch of the test pit and distance and direction from permanent, identifiable location marks
- A description of the material removed from the excavation
- A record of samples collected
- The presence or absence of water in the test pit and the depth encountered
- The presence or absence of bedrock in the test pit and the depth encountered
- Other readings, or measurements taken during excavation, including field screening reading